



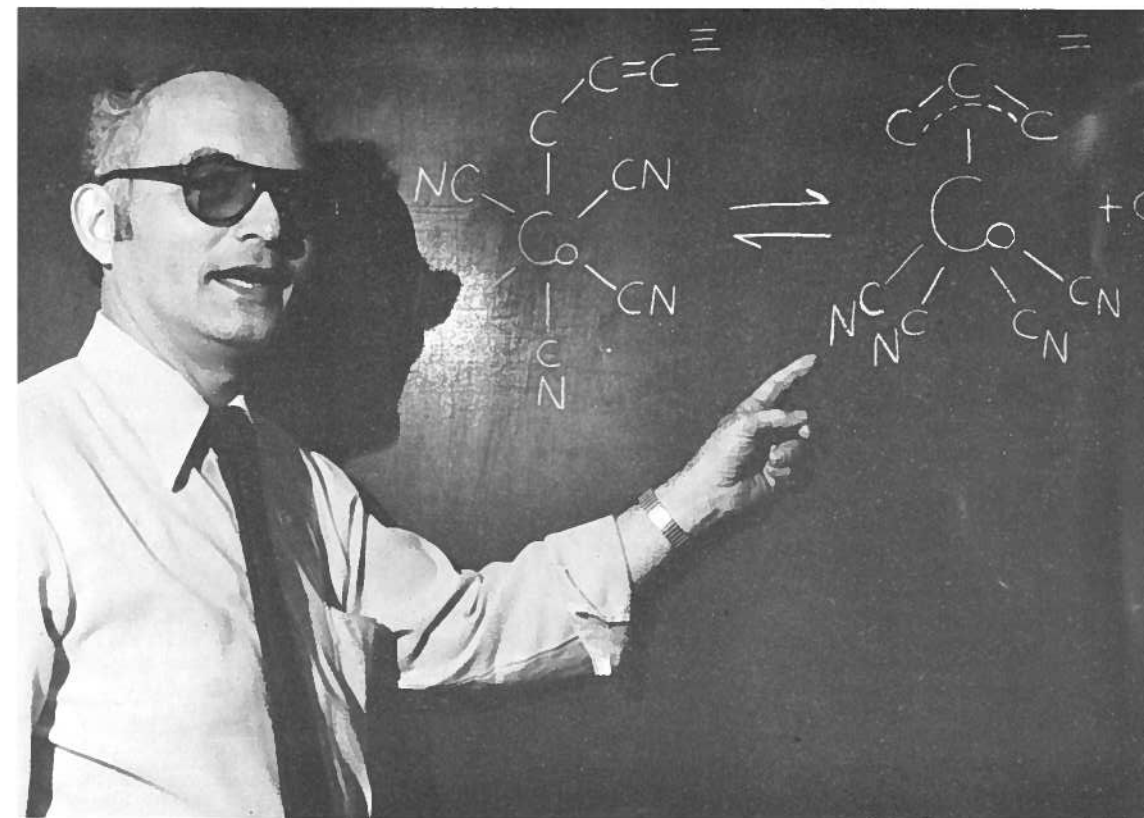
# THE CHESAPEAKE CHEMIST

MARYLAND SECTION  
AMERICAN CHEMICAL SOCIETY

VOL. XXX

NOVEMBER, 1974

NUMBER 8



## GUIDELINES FOR EMPLOYERS

Prepared by the Council Committee  
on Professional Relations  
American Chemical Society

### Preamble

The chemist or chemical engineer is a professional, a status achieved through intensive study and scientific accomplishment. The employer depends on the knowledge, loyalty, and commitment to science of the chemist\*, and the chemist should be provided working conditions, financial rewards, and personal security such that the scientific contributions can be maximized.

### I. Terms of employment

1. The conditions of employment should be fully described to the prospective employee, and the chemist should be presented with a list of these conditions at the time an employment offer is made.

2. Legal obligations of the chemist to the employer should be clearly set forth in an employment agreement.

3. Salaries on hiring should be competitive with those offered by similar organizations employing chemists of like experience and training. In addition, sound indirect compensation programs should be provided. These include among others, retirement benefits, health and life insurance, sick leave, paid holidays, and paid vacations.

4. Employment and advancement shall be based solely on professional competence and ability to adequately perform assigned responsibilities without regard to factors of age, race, religion, political affiliation or sex. The employer should recognize that at times during the chemist's employment, family responsibilities may necessitate the granting of personal leaves, flexible working schedules, and part-time employment. All chemists should be informed at the time of their employment that these conditions are available and negotiable.

5. Termination conditions should be indicated at hiring.

\* For simplicity, the term "chemist" in the guidelines refers to both chemists and chemical engineers.

## II. Employment environment

### A. Physical conditions

1. Physical facilities should be such as to enable the chemist to work safely and efficiently. New personnel should be instructed in proper handling of material and equipment in order to minimize risk of personal injury. Continuing environmental studies should be conducted to assure that chemists are asked to function only under safe working conditions.

2. Normal working hours should leave the chemist adequate time for personal study, rest, and recreation.

### B. Operational factors

1. Management has the responsibility to determine each chemist's aptitude and suitability and, within the framework of job requirements, to make assignments best equipped to utilize these.

2. Employers should maintain conditions which will enable chemists to make their best contributions.

3. Employers have a responsibility for discussing promptly with and otherwise advising chemists of unacceptable performance or ineptitude in their chosen field. Confidential written records of such notices should be maintained by the employer. (The Committee recommends that such records be employee attested.)

Desirably, information concerning inadequate performance should be communicated to chemists early in their term of employment and they should be advised of means which will enable them to meet their employer's standards of performance. Failing this, other avenues such as a different career orientation or employment elsewhere should be suggested. Performance reviews should be made on a regular basis and at least annually.

4. Judgment of the chemist's scientific performance should be rendered by his supervisor who is also a scientific peer or, alternatively, the supervisor should consider the evaluation of the chemist's scientific performance by scientific peers.

5. Consistent with the employer's organizational needs, chemists should as a matter of policy, be encouraged to attend professional meetings and

(Continued on page 10)



# THE CHESAPEAKE CHEMIST

VOL. XXX

NOVEMBER, 1974

NUMBER 8

### EDITORIAL STAFF

Howard J. Cohen.....Editor  
Glidden-Durkee Div. of SCM  
3901 Hawkins Point Road  
Baltimore, Maryland 21226  
Phone: 633-6400

Mitchell Dudnikov...Associate Editor  
H. T. Campbell Son's Co.  
Towson, Maryland 21204  
Phone: 823-7000

Eli Freedman.....Associate Editor  
Ballistic Research Laboratories  
APG, Maryland 21005  
Phone: 278-3082

Jo Lannon..... Editorial Assistant  
Glidden-Durkee Div. of SCM  
3901 Hawkins Point Road  
Baltimore, Maryland 21226  
Phone: 633-6400

### SECTION OFFICERS

Donald E. Jones.....Chairman  
Chemistry Department  
Western Maryland College  
Westminster, Maryland 21157

A. Allen Bednarczyk...Chairman Elect  
McCormick & Co., Inc.  
204 Wight Avenue  
Hunt Valley, Maryland 21031

Melvin P. Miller.....Secretary  
Chemistry Department  
Loyola College  
Baltimore, Maryland 21210

Ernest F. Silversmith.....Treasurer  
Chemistry Department  
Morgan State College  
Baltimore, Maryland 21212

### COMMITTEE CHAIRMEN

Awards and National  
Nominations..... William Galetto  
667-7481

Chemical Education..Melvin Miller  
323-1010

House and Program... A. Bednarczyk  
667-7480

MARM Delegate..... Tim Parr  
765-2658

Member Assistance... Joseph Cogliano  
531-5711

Membership..... John Kolbe  
247-0700

Public Relations.... Carl Minnier  
682-6000

Publicity..... Dave Roswell  
Norbert Zaczek  
323-1010

Remsen Award..... Brown Murr  
366-3300

Scholarship..... E. Silversmith  
323-2270

### BUSINESS STAFF

Kent R. Zeller..... Business Manager  
McCormick & Co., Inc.  
Industrial Flavor Division  
204 Wight Avenue  
Hunt Valley, Md. 21031  
Phone: 667-7432

### NEXT MEETING

MARYLAND CHEMIST AWARD

DECEMBER 18, 1974

The Chesapeake Chemist is published monthly September through May by the Maryland Section of the American Chemical Society. Address editorial comments to Howard J. Cohen, Glidden-Durkee, Div. of SCM Corp., 3901 Hawkins Point Road, Baltimore, Md. 21226. Phone 633-6400. Address advertising inquiries and copy to Kent R. Zeller, McCormick & Co., Inc., 204 Wight Ave., Hunt Valley, Md. 21031.

## TOWSON STATE COLLEGE

L. M. Sweeting

The current enrollment at State College is about 7500, plus about 5000 evening and summer students. The Chemistry Department teaches nearly 600 of these each semester and has about 70 majors. All of our recent graduates are employed in chemistry-related jobs; several are successful graduate students at the Johns Hopkins University, The University of Maryland, and the University of California at San Diego.

The faculty has grown, but not fast enough to meet the still increasing enrollments. We now have nine regular faculty, one visiting lecturer, two assistant instructors, a stock clerk, a secretary, and four part-time faculty.

The faculty are as follows.  
PROFESSOR: Uno Kask.  
ASSOCIATE PROFESSORS: Floyd A. Blankenship, Frank R. Milio, Arthur C. Yarborough, Jr.  
ASSISTANT PROFESSORS: John David Rawn, Linda M. Sweeting, Joseph J. Topping, Alan S. Wingrove.  
INSTRUCTOR: David Larkin.  
VISITING LECTURER: Robert L. Caret

Alan S. Wingrove replaced Floyd A. Blankenship as department chairman, effective September, 1974.

## HOOD COLLEGE

Phyllida M. Willis

The enrollment in general chemistry is more than double the last decade's average. New faculty members include Mrs. Randolph C. Thompson (Gloria), part-time instructor, and Dr. Maria C. Tsai, part-time assistant professor.

\*\*\*\*

### AND NOW...A WORD FROM OUR SPONSORS

The Maryland Section wishes to thank the sponsors of the Cocktail Hours at the section meetings: duPont Instrument Division, Beckman Instruments, VWR Scientific, Scientific Products, Hewlett-Packard, McCormick & Co., Waters Associates, Perkin-Elmer, Fisher Scientific, Varian Associates, and Macalester Bicknell.

## THE JOHNS HOPKINS UNIVERSITY

B. S. Edwards

Professor Robert G. Parr has accepted an appointment as the William R. Kenan, Jr., Professor of Theoretical Chemistry at the University of North Carolina, Chapel Hill. He moved to Chapel Hill in mid-September.

### IN PRINT

"Tunable Laser Fluorescence Method for Product State Analysis," R.N. Zare and Paul J. Dagdigian, *SCIENCE* **185**, 739 (1974).

The Reactions of Organozinc Reagents with Bis(N-butoxy)-methyl-t-Buylamine," Peter Y. Johnson and M.A. Priest, *JACS* **96**, 5678 (1974).

"A Model for the Photochemical Formation of 6-Aza Penicillin Isomers," C.E. Hatch and Peter Y. Johnson, *TETRAHEDRON LETTERS*, 2719 (1974).

### TALKS

Dr. Dwaine O. Cowan gave an invited lecture at the Conference on the Search for High TC Superconductors sponsored by the Isreal National Council for Research & Development at Kfar Giladi, Israel, June 23-28, 1974.

Dr. Peter Y. Johnson gave an invited talk before the Chemical Society of Washington on "The Synthesis and Reactions of 6-Alkoxytetrahydro-1,3-Oxazines-A New Class of Antineoplastics." The same talk was presented at the Sixth Northeast Regional Meeting, ACS, at the University of Vermont, Burlington.

\*\*\*\*

## EMPLOYMENT OPPORTUNITY

### PHARMACEUTICAL CHEMIST

Minimum qualifications - B.S. degree with three years' experience, or M.S. degree with at least one year experience. Work involves routine identification tests and other analytical studies, including application of instrumental methods on pharmaceuticals to determine compliance with State and Federal drug laws. Interested applicants should contact Dr. Nathan Levin, Md. State Bur. of Labs., 16 E. 23rd St., Balto., Md. 21218; phone 383-2865.

## NOVEMBER MEETING

### DATE:

Wednesday, November 20, 1974

### PLACE:

Eudwood Gardens Lecture Room,  
Eudwood Plaza, Joppa Road near  
Goucher Boulevard.

### SPEAKERS AND TOPICS:

5:30 PM  
Dr. Jack Kwiatek, U.S.  
Industrial Chem. Co.:  
"Homogeneous Catalytic  
Hydrogenation"

8:30 PM  
Prof. Roald Hoffmann,  
Cornell University:  
"Theoretical Aspects or  
Pentacoordination"

### SOCIAL HOUR:

There will be a social hour  
after the meeting. Refresh-  
ments will be served.



DR. ROALD HOFFMANN

### COCKTAILS AND DINNER:

Eudwood Gardens Dining Room  
Cocktails 6:30-7:15 courtesy of  
Scientific Products.  
Hot buffet dinner (7:15) \$5.50  
per person. Retired chemists,  
students and their spouses may  
attend the dinner at \$3.50 each.  
Reservations are necessary for  
the dinner and should be made  
with

Dr. Allen Bednarczyk  
McCormick and Co., Inc.  
204 Wight Avenue  
Hunt Valley, Maryland 21031  
Phone 667-7480, 667-7470.

It is not necessary to be a  
member of the American Chemical  
Society to attend the dinner or  
the talks, and the talks may be  
attended without attending the  
dinner. You are invited to  
bring your wife and friends to  
both the dinner and the meeting.



DR. JACK KWIATEK

## JACK KWIATEK

Born in Kansas City, Missouri, Jack Kwiatek received his B.S. degree in chemistry from the University of Illinois in 1944. After serving two years in the U.S. Navy as Lieutenant (J.G.), he entered Cornell University and received the Ph.D. degree in 1950 with research under the direction of Professor Alfred Blomquist.

He joined the M. W. Kellogg Company that same year and remained there until 1954. Dr. Kwiatek served as a research associate with the General Electric Company in Schenctady, New York, for the next four years after which time he joined the Research Division of U.S. Industrial Chemicals Company, where he is currently a senior research associate.

He has served as an Adjunct Assistant Professor of Chemistry of the University of Cincinnati (1961-1965), and was a Visiting Scientist at the Weizmann Institute of Science (1968-1970).

Dr. Kwiatek's research interests have centered around the area of hydrogenation by homogenous catalysts, an area in which he has achieved an international reputation. In particular, Dr. Kwiatek has made pioneering contributions to the field of homogeneous catalysis when he explored homogeneous catalytic hydrogenation by pentacyanocobaltate.

A large number of substrates of both organic and inorganic nature were examined, with both catalytic and stoichiometric reactions being encountered. Mechanisms of reactions were also elucidated along the way. The mushrooming effect seen in the area of homogeneous catalysis over the last ten years is due in large part to this pioneering work.

Dr. Kwiatek has published a substantial number of papers describing his work and is the principal inventor on several patents. Additionally, he has addressed scientific gatherings both here and abroad on the area of his speciality.

Earlier this year, Dr. Kwiatek was selected to receive the 1974 Cincinnati Chemist Award.

## HOMOGENEOUS CATALYTIC HYDROGENATION

Since it was first recognized in 1938 that a metal complex in solution was capable of activating molecular hydrogen, numerous homogeneous hydrogenation catalyst systems have been discovered. The extensively studied aqueous pentacyanocobaltate(II) anion (Kwiatek) and non-aqueous rhodium(I)triphenylphosphine (Wilkinson) systems have provided considerable understanding of the detailed mechanisms and systematics of hydrogenation cycles, as well as the factors affecting selectivity including stereo-selectivity. These investigations have stimulated the development of asymmetric hydrogenation and the growth of other areas of homogeneous catalysis. Present gaps in our knowledge and future prospects for this exciting research area will be discussed.

## ROALD HOFFMANN

Roald Hoffmann was born in Zloczaw, Poland in 1937. Having survived the Nazi occupation, in 1946 he left Poland for Czechoslovakia, Austria, Germany, and arrived in the U.S. in 1949. He graduated Stuyvesant High School in 1955, and then Columbia College (B.A., summa cum laude, 1958). He did his graduate work at Harvard (M.A., 1960, Ph.D., 1962), where he studied with Martin Gouterman and William Lipscomb. He spent nine months in the USSR on a graduate student exchange, and worked with A. S. Davydov. In 1962, he was elected a Junior Fellow in the Harvard Society of Fellows. In 1965 he joined the Department of Chemistry of Cornell University, where he is now the John A. Newman Professor of Physical Science.

Dr. Hoffman's research interests are in the electronic structure of stable and unstable molecules, and of transition states in reactions. He applies a variety of computational

methods, semi-empirical and non-empirical, as well as qualitative arguments to problems of structure and reactivity of both organic and inorganic molecules of medium size. His first major contribution was the development of the extended Hückel method, a molecular orbital scheme which allowed the calculation of the approximate  $\sigma$  and  $\pi$  electronic structure of molecules, and which gave reasonable predictions of molecular conformations and simple potential surfaces. His second major contribution has been a two-pronged exploration of the electronic structure of transition states and intermediates in organic reactions. In a fruitful collaboration with R.B. Woodward, he has applied simple, powerful arguments of symmetry and bonding to the analysis of concerted reactions. These considerations have been of remarkable predictive value and have stimulated much productive experimental work. In the second approach, he has analyzed by semi-empirical methods the molecular orbitals of most types of reactive intermediates in organic chemistry—carbonium ions, diradicals, methylenes, benzynes, &c. His current research interests, in addition to a continuing interest in orbital symmetry and the electronic structures of organic transition states and intermediates, are in inorganic reaction mechanisms, S and P chemistry, and organometallics.

Dr. Hoffmann was elected a member of the National Academy of Science in 1972. He has been the recipient of numerous awards and special lectureships, including the ACS Award in Pure Chemistry, the Harrison Howe Award, and (with R.B. Woodward), the first Arthur C. Cope Award in Organic Chemistry.

## THEORETICAL ASPECTS OF PENTA-COORDINATION

A molecular orbital analysis of the electronic structure of pentacoordinate compounds of both group V and transition elements will be described. 1. Preferred geometries among the trigonal bipyramid, square pyramid, and lower symmetry alternatives, as well as the energetics of the pseudo-rotation process connecting these geometries have been studied. 2. In the phosphoranes and related group V compounds an examination of substituent effects rationalizes favored apical substitution in the trigonal bipyramid and preferred basal substitution in the square pyramid by better  $\sigma$  and  $\pi$  acceptors. If a substituent has a single  $\pi$  system and is located in the equatorial position, it will prefer to have its acceptor orbital perpendicular to the equatorial plane or its donor orbital in that plane. The concerted fragmentation reaction  $PR_5 = PR_3 + R_2$  is symmetry forbidden for the least-motion axial-equatorial departure from a trigonal bipyramid, and allowed for axial-axial or equatorial-equatorial departure. 3. In the transition series our analysis shows that for the trigonal bipyramid  $d^0 - d^4$  and  $d^10$  low-spin complexes will show the same systematics as the phosphoranes. At  $d^5$  there begins a trend, culminating at  $d^8$ , to reverse precisely these conclusions. Thus in low-spin  $d^8$  complexes the axial bonds should be stronger and both  $\sigma$  and  $\pi$  acceptors should prefer the equatorial sites. With a similar analysis for the square pyramid geometry we provide a systematic account with predictive power, for site and conformation preferences of substituents in a pentacoordinate molecule.

### ORGANIC MICROANALYSES GALBRAITH LABORATORIES, INC.

P. O. Box 4187  
Knoxville, Tenn. 37921  
(615) 546-1335  
HARRY W. GALBRAITH, Ph.D.

Scientific  
Glassblowing  
Services

Custom Fabrication & Repair Glassblowing

3411 ROSALIE AVENUE  
ROBERT RAKOWSKI BALTIMORE, MARYLAND 21234

## EXECUTIVE COMMITTEE MINUTES

Minutes of the Executive Committee Meeting of the Maryland Section of the American Chemical Society held on September 30, 1974 at the Millbrook Club, Loyola College.

Present: A. Bednarczyk, Y. H. Caplan, H. Cohen, E. Freedman, W.G.Galetto, D. E. Jones, R. J. Kassel, J. J. Kaufman, M. P. Miller, C. Minnier, F. T. Parr, D. F. Roswell, R. Schneider, E. F. Silversmith, T. Simmons

The meeting was called to order by the chairman, D.E. Jones at 8:25 P.M.

The minutes of the meeting of May 22, 1974 were approved as reported in the September issue of the Chesapeake Chemist.

The treasurer's report was read by E. Silversmith. The report showed a cash balance in the bank accounts of \$10,410.09. After several questions about details in the report, the report was approved as submitted. A suggestion was made that a finance committee be established so that an operating budget could be prepared in advance of each year and it was also suggested that the possibility of depositing part of the fund in some sort of high-return account be looked into. The chairman agreed to appoint such a committee.

W. Galetto reported for the Awards Committee that a number of nominees' names had been received for the Maryland Chemist Award and the nominees were under consideration.

D. Jones announced that an awardee for the regional high school teaching award had been made for this year and that the Awards Committee was looking for nominees for that award for next year. Nominees are still being sought for the E. Emmet Reid Award and nominations for this award are open until January 1, 1975.

M. Miller of the Education Committee reported that he has been in correspondence with Mr. Harold

Abramson of the American Institute of Chemical Engineers. Mr. Abramson has requested permission to use the Maryland Section mailing list for the purposes of sending out educational brochures for the AIChE. The Executive Committee approved the use of this list for the stated purpose on a one-time basis.

A. Bednarczyk reported for the Program Committee that the committee is seeking two speakers to complete this year's program.

D. Jones reported for J. Cogliano of the Member Assistance Committee that a number of bound journals are available through the generosity of a widow of a former member and that the committee is looking for a suitable disposition of these journals.

D. Roswell of the Publicity Committee asked whether the members had been receiving the posters announcing the monthly meetings. Several members indicated that they had not been receiving the posters. D. Roswell indicated that he would check into the mailing list to insure that persons who should be receiving the posters were in fact on the list.

A motion was made that the Scholarship Committee be abolished since the scholarship program had been completed. The motion was approved.

H. Cohen of the Chesapeake Chemist reported that the October issue had gone to press and that there was an impending printers' strike but that the strike would not effect publication of future issues of the Chesapeake Chemist.

E. Silversmith presented a request from K. Zeller of the Chesapeake Chemist for \$600 to pay outstanding bills for the Chesapeake Chemist. The Committee authorized the expenditure of \$600 plus an additional \$400 which may be spent at the discretion of the Chairman and the Treasurer if it should be needed.

Under the heading of Old Business, there was a brief discussion of the costs involved in the Remsen Award. The Treasurer was directed to look into all costs connected with the Remsen Award with further discussion of the possibility of increasing the stipend of this award to be taken up at a later meeting.

Under the heading of New Business, D. Jones reported that the 1978 MARM is scheduled to be held in the Baltimore area. He is looking for a General Chairman and would like any suggestions that members might have about a person who could serve as Chairman. He

is also looking for a suitable location. The locations under consideration are the Hilton Hotel, The Hilton Inn, Hunt Valley Inn, Goucher College, Towson State College, UMBC, and the Cross Keys Inn in Columbia.

J. Kaufman reported that she had recently been elected to the Steering Committee of the Middle Atlantic Regional Counselors (MARC).

The meeting was adjourned at 9:45 P.M.

Respectfully submitted,  
Melvin P. Miller  
Secretary

## NOMINATIONS FOR SECTION OFFICERS

Prior to the talk at 8:30 P.M. the election will be held for officers, councilors and members-at-large of the Executive Committee to serve the Maryland Section in 1975. The Nominating Committee, consisting of Dr. Joyce Kaufman (Chairman), Dr. Tom Simmons, Dr. Herbert Aaron and Dr. Yale Caplan, has presented the following slate of candidates. Additional nominations may be received from the floor with the understanding that any candidate must have given prior consent to such nomination.

Chairman-elect .....	John Kolbe	Members-at-large:
Secretary .....	James Leslie	Clara Adams
Treasurer .....	Ernest F. Silversmith	Floyd A. Blankenship
Councilor .....	F. Timothy Parr, '75-'77	Patrick Callery
Alternate Councilor....	Donald E. Jones, '75-'77	Nathan Klein
		Robert Schneider

### -----Tear Out Dinner Reservation Form -----

There is enclosed \$ \_\_\_\_\_ (\$5.50 per person)\* for dinner reservations at Eudowood Caterers, Eudowood Plaza, for the following persons.\*\*

<u>Name</u>	(Please print or type)	<u>Affiliation</u>
-------------	------------------------	--------------------

\*Please make checks payable to Maryland Section, ACS and mail together with reservation form to Dr. Allen Bednarczyk, McCormick and Co., Inc., 204 Wight Avenue, Hunt Valley, Md. 21031, or phone 667-7470, 667-7480.

\*\* Return by Friday preceeding next meeting.

(Guidelines from page 2)  
to take formal courses of study which will enable them to maintain their scientific competence.

6. Consistent with organizational requirements and policy, the employer should permit reasonable compensated leave of absence for professional study to maintain competence or to improve knowledge in the chemist's field.

7. Employers should not inhibit the movement of a chemist from one organization to another, possibly even a competitor, except as the employer maintains conditions and rewards which encourage the chemist to remain in his employ. Competing employers should not assign relocated chemists to projects which could compromise their professional ethics through use of trade secrets information.

8. Dual ladders of advancement for chemical supervisors and chemists should be provided and should be realistic. Financial rewards for individuals at the same level should be similar, even though responsibilities are different.

9. Managerial and professional contributions should both be considered as essential to the success of the corporate effort. Individual chemists should be informed of economic data as it pertains to their effort and appropriate financial and business documents should be made available to them.

10. Meritorious performance should be rewarded by professional advancement.

11. Consistent with patent procedures, trade secrets, and corporate objectives, the chemist should be given every opportunity to publish work in recognized scientific journals and to present findings at scientific meetings.

12. To provide for full utilization of their capabilities, chemists should be permitted to consult with other professionals in their field, with the understanding that they will not reveal confidential company information in any such discussions. In the event of scientific controversy, it is recognized that the chemist will act as an individual and not as a representative of the company.

13. Chemist employees should be given an opportunity to participate

in professional and scientific society affairs. Consistent with the performance of regular duties, they should be allowed sufficient time to carry out their responsibilities in such organizations.

14. Chemist employees should have freedom to participate in political and community activities. Such participation, however, should be undertaken solely as a responsibility of the individual without involving the employer.

### III. Termination conditions

1. Any chemist who is terminated should be given a minimum of four weeks' advance notice.

Any chemist who plans to terminate employment voluntarily should give at least four weeks' notice.

2. The chemist should receive severance pay consisting of two weeks' salary for each year of service. Beyond the minimum four weeks' advance notice, additional notice in lieu of severance pay may be provided by mutual consent of both parties.

3. Every effort should be made to place the individual in another position within the organization, including retraining for a new position if necessary. When it is determined that such relocation is not possible, the chemist should be given assistance in finding employment elsewhere.

4. Any chemist terminated with a minimum of 10 years' total service should have fully vested pension rights with survivor benefits.

5. Any chemist who is involuntarily retired by an employer should be treated at least as well as an employee dismissed for economic reasons (i.e., be given severance pay, notice, vested pension privileges, etc.).

6. Any chemist having a minimum of 10 years of total service should not be terminated except for continuing evidence of previously documented inadequate performance or for cause. If either inadequate performance or cause is claimed the chemist's case should be reviewed by two levels of management above the immediate supervisor. Management should also consider the opinion of the chemist's performance by scientific peers.

### AN OBSOLESCE LIFE Alan C. Nixon

This is the title of a "commentary" in the September '74 *HARPER'S* by Dr. Molly Gleiser of Berkeley, California, who describes herself as a physical chemist, now 48 years old, and phased out of her job 3 years ago at the UC Berkeley Radiation Laboratory because of lack of funds. She describes all the various things she has done in trying to get a job, including more than 60 applications, many phone calls, etc., and to live, such as selling and making craft products and jewelry, writing articles, duty as a crossing guard, working in a "broiler room," etc. She says, "I am the author of four technical books and ten papers in my own field. I have worked for 20 years in my profession. At the end of this time I earned slightly less than a grade-school teacher, had three weeks' vacation a year, could have been fired with two weeks' notice, had no pension rights, and no social security."

I didn't know whether this was a put-on or not so I got in touch with Dr. Gleiser by phone. She assures me

that the story is completely factual (but incomplete owing to lack of space.) She was formerly an ACS member but had dropped out. I encouraged her to use the California Section and national ACS employment services. Whether this will help or not I don't know. Certainly she falls in the age and sex category that seems to have the greatest difficulty in finding new jobs. However, it also happens to members of the "stronger" sex and in other disciplines.

Let's hope we can fashion a mechanism that will prevent such a waste of human resources.

--NICK NACKS, October, 1974

\*\*\*\*

*The opinions expressed by the writers are their own and does not necessarily reflect the opinion of the Editorial Staff. It is important that varying opinions be expressed to our readers so that they may arrive at their own conclusions. Letters to the Editor are most welcome. Space limitations rather than content will determine publication.*

**AT  
MACALASTER BICKNELL  
YOU CAN SPECIFY  
"BRAND NAMES"  
OF THE INDUSTRY  
... Laboratory and Scientific  
--- that is**

***"Consider Our Warehouse Stock Your Personal Inventory"***



**MACALASTER BICKNELL CO. OF N. J., INC.**

**NORTH AND DEPOT STREETS, MILLVILLE, N. J. 08332**

**Area Code 609—825-3222**

The Chesapeake Chemist  
University of Maryland  
636 W. Lombard Street  
Baltimore, Maryland 21201

Dr. Yale Howard Caplan  
8100 Tapscott Court  
Pikesville, Md. 21208

Nonprofit Org.  
U. S. Postage  
PAID  
Baltimore, Md.  
Permit No. 2917

PLEASE DO NOT DELAY — DATED NOTICE INSIDE

# 1874

## A Vintage Year for Chemists

Analyzing the "good stuff" for chemists started in 1874. Then, Eimer & Amend of New York (Fisher's predecessor firm) was the first to report an exact analysis on every bottle of its top quality chemicals. Later, when E&A became Fisher's New York branch, we were proud to continue the exact lot analysis practice. Through the following decades, Fisher has continuously advanced the manufacture of reagent chemicals.



Today, almost 1,000 Fisher reagents carry actual lot analyses (not mere maximums) to assure you of their utmost purity.

This year marks Fisher's first centennial of the Actual Lot Analysis and, also, the second "Centennial of Chemistry." Fisher invites all professional descendants of Priestley to celebrate these significant chemical events together and offers a toast: "to another century of progress."



**Fisher Scientific Company**  
711 Forbes Avenue  
Pittsburgh, Pa. 15219